**Table S2**. Pairwise comparisons on cognitive functions between FES, CHR, FHR and control groups based on linear mixed models.a

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  | FES vs. CHR | FES vs. FHR | FES vs. HC | CHR vs. FHR | CHR vs. HC | FHR vs. HC |
| Cognitive functions  | β (SE) | *P* | β (SE) | *P* | β (SE) | *P* | β (SE) | *P* | β (SE) | *P* | β (SE) | *P* |
| Letter-number-span | -0.42 (0.16) | 0.04 | -0.73 (0.16) | <0.001 | -1.06 (0.15) | <0.001 | -0.31 (0.17) | 0.47 | -0.63 (0.16) | <0.01 | -0.32 (0.17) | 0.33 |
| Digit symbol coding | -0.62 (0.20) | 0.01 | -1.56 (0.21) | <0.001 | -1.77 (0.19) | <0.001 | -0.94 (0.22) | <0.001 | -1.14 (0.20) | <0.001 | -0.21 (0.21) | 1.00 |
| Monotone counting | -0.25 (0.71) | 1.00 | -0.50 (0.75) | 1.00 | -2.20 (0.68) | <0.01 | -0.25 (0.77) | 1.00 | -1.95 (0.70) | 0.04 | -1.69 (0.75) | 0.15 |
| Logical memory | -0.60 (0.20) | 0.02 | -0.57 (0.22) | 0.04 | -1.04 (0.19) | <0.001 | 0.02 (0.22) | 1.00 | -0.45 (0.20) | 0.16 | -0.47 (0.21) | 0.17 |
| Visual reproduction | 0.27 (0.17) | 0.68 | -0.08 (0.16) | 1.00 | -0.56 (0.16) | <0.01 | -0.35 (0.18) | 0.68 | -0.83 (0.17) | <0.001 | -0.48 (0.18) | 0.04 |
| Category verbal fluency | -0.54 (0.18) | 0.02 | -0.48 (0.19) | 0.07 | -1.09 (0.17) | <0.001 | 0.06 (0.19) | 1.00 | -0.55 (0.18) | 0.01 | -0.62 (0.19) | 0.01 |
| Cognitive composite score | -0.55 (0.21) | 0.07 | -0.84 (0.23) | <0.01 | -1.48 (0.21) | <0.001 | -0.30 (0.23) | 1.00 | -0.94 (0.21) | <0.001 | -0.64 (0.23) | 0.03 |

CHR, Clinical high-risk; FHR, Family high-risk; FES, First-episode schizophrenia-spectrum disorder; HC, Healthy controls.

a Linear mixed models adjusted for age were performed for group comparisons on individual cognitive test performance. Bonferroni correction was applied in post-hoc pairwise comparison analyses on all individual cognitive tests. Bonferroni-corrected *p* values were presented, with *p*<0.05 indicating statistical significance.